Prior to further substantive examination, Applicants request entry of the following amendments.

AMENDMENTS

IN THE SPECIFICATION:

At page 72, line 25, please replace the paragraph between lines 1 and 13 with the following rewrittwn paragraph.

-- Human fat tissue RNA was analyzed on Northern blot, RNA species of similar size to the mouse *ob* gene was detected. Sequencing and analysis of cDNA clones revealed that human *ob* also encodes 167 amino acid polypeptide (Figures 2 and 3). Two classes of cDNA with or without three base pairs deletion were found in human as well (Figure 6). The mouse and human *ob* genes were highly homologous in the predicted coding region, but had only 30% homology in the available 3' and 5' untranslated regions. An N-terminal signal sequence was also present in the human *ob* polypeptide. Comparison of the human and mouse *ob* polypeptide sequences showed that the two molecules share an overall 84% identity at amino acid level (Figure 4). The N-termini of the mature proteins from both species share even higher homology, with only six conservative and six nonconservative amino acid substitutions among the N-terminal 100 amino acid residues. --

At page 76, please replace the paragraph between lines 17 and 23 with the following rewritten paragraph:

--To establish the relationship between obesity and genetic alterations in the ob gene in humans, the sequence of the human ob gene was determined (FIG. 20A) (SEQ ID NO:22). Specific primers from the human coding sequence were used to screen a human P1 library. Three different P1 clones were obtained, grown up, and PCR amplified using primers flanking the splicing site between the first and second coding exon. The entire intron region,